

## **REMARKS**

### **INTRODUCTION**

In accordance with the foregoing, claims 1, 4, 6, 13, 22 and 29 have been amended. Claims 19-21 have been cancelled. Claims 1-18 and 22-29 are pending and under consideration.

### **CLAIM REJECTIONS – 112**

Claim 1 was rejected under 35 USC 112, second paragraph, as being indefinite.

Appropriate correction has been made to claim 1 to correct the antecedent basis issue noted by the Examiner.

Withdrawal of the foregoing rejection is requested.

### **CLAIM REJECTIONS – 103**

Claims 1, 3-8, 10-12, 19, 20, 22-24, 28 and 29 were rejected under 35 USC 103(a) as being unpatentable over Saito (US 6,404,145) (hereinafter "Saito") in view of Park et al. (US 7,098,903) (hereinafter "Park") and further in view of Shin (US 5,078,476) (hereinafter Shin").

Claims 13-15, 17, 18 and 21 were rejected under 35 USC 103(a) as being unpatentable over Saito in view of Shin.

Claims 2 and 25-27 were rejected under 35 USC 103(a) as being unpatentable over Saito in view of Park and Shin and further in view of Yoo et al. (US 2003/0214478) (hereinafter "Yoo").

Claim 9 was rejected under 35 USC 103(a) as being unpatentable over Saito in view of Park and Shin and further in view of Anderson et al. (US 6,678,005) (hereinafter "Anderson").

Claim 16 was rejected under 35 USC 103(a) as being unpatentable over Saito in view of Shin and further in view of Anderson et al. (US 6,678,005) (hereinafter "Anderson").

#### **Claims 1-3**

Amended claim 1 recites: "...a controller to detect the extracted horizontal synchronization signal from the digital video signals to determine a display mode, to output the first and second predetermined sampling clock signals to the signal converter and the scaler, respectively, according to the determined display mode, and to generate on/off signals whenever the horizontal synchronization signal is transiently changed; and a backlight driver to

drive the backlights in synchronization with the detected horizontal synchronization signal and being turned on or off according to the on/off signals, input from the controller, wherein the backlight driver is turned off during a display mode change, and turned on thereafter, whereby the backlight driver is prevented from being turned off due to a transient horizontal synchronization signal.”

In the Office Action, in the “Response to Arguments” section, the Examiner noted that the feature argued in the previous response where the backlight driver is turned off during the display mode change, and turned on thereafter, but the backlight driver is prevented from being turned off due to a transient horizontal synchronization signal was not actually recited in the claims.

As shown above, claim 1 has been amended to clarify that the backlight driver is turned off during a display mode change, and turned on thereafter, whereby the backlight driver is prevented from being turned off due to a transient horizontal synchronization signal.

Accordingly, in its present form it is respectfully submitted that that the previously applied broader interpretation of claim 1 where the backlight driver can be viewed as on even with respect to an OFF signal.

Regarding the relied upon references, although Shin discusses supplying or cutting off power to the backlight according to the determination of a video signal input, Shin, or the other relied upon references, do not discuss a backlight driver to drive the backlights in synchronization with the detected horizontal synchronization signal and being turned on or off according to the on/off signals, input from the controller where the backlight driver is turned off during the display mode change, and turned on thereafter, but the backlight driver is prevented from being turned off due to a transient horizontal synchronization signal.

This technical feature of claim 1 provides that the panel and the backlight driver in the LCD are synchronized with one another to avoid oscillatory interference therebetween and remove noise on a screen, and the backlight driver is turned off during the display mode change to prevent the backlights from being turned off, which is an advantage and technical feature not realized in the other relied upon references.

Claims 2 and 3 depend on claim 1 and are therefore believed to be allowable for at least the foregoing reasons.

Withdrawal of the foregoing rejections is requested.

**Claims 4-29**

Amended claim 4 recites: "...applying backlight off signals to the backlight driver while the horizontal synchronization signal is changing, and until the horizontal synchronization signal is detected, and applying backlight on signals to the backlight driver when the horizontal synchronization signal is detected, wherein the backlight driver is turned off during a display mode change, and turned on thereafter, whereby the backlight driver is prevented from being turned off due to a transient horizontal synchronization signal."

Amended claim 6 recites: "...generating the backlight driver off signal until the second horizontal synchronization signal is detected; and turning the backlight driver on or off according to the backlight driver on/off signals, wherein the backlight driver is turned off during a display mode change, and turned on thereafter, whereby the backlight driver is prevented from being turned off due to a transient horizontal synchronization signal."

Amended claim 13 recites: "...resuming driving the backlights in synchronization with a second synchronization signal in a video signal if the display mode change is completed; and the stopping the driving continuing until the second synchronization signal is detected, wherein the backlight driver is turned off during a display mode change, and turned on thereafter, whereby the backlight driver is prevented from being turned off due to a transient horizontal synchronization signal."

Amended claims 22 recites: "...a backlight driver to drive the backlights in synchronization with a second synchronization signal and being turned on or off according to the on/off signals input from the controller, wherein the controller generates the off signals until the second synchronization signal is detected, and the backlight driver is turned off during a display mode change, and turned on thereafter, whereby the backlight driver is prevented from being turned off due to a transient horizontal synchronization signal."

Amended claim 29 recites: "...wherein the controller generates the backlight driver off signals until the second synchronization signal is detected, and the backlight driver is turned off during a display mode change, and turned on thereafter, whereby the backlight driver is prevented from being turned off due to a transient horizontal synchronization signal."

Similar to the argument for claim 1, it is respectfully submitted that none of the relied upon references discuss the above noted features of independent claims 4, 6, 13, 22 and 29.

Claims 19-21 have been cancelled. Claims 5, 7-12, 14-18 and 23-28 depend on one of claims 4, 6, 13 and 22, respectively, and are therefore believed to be allowable for at least the foregoing reasons.

Withdrawal of the foregoing rejections is requested.

## CONCLUSION

There being no further outstanding objections or rejections, it is submitted that the application is in condition for allowance. An early action to that effect is courteously solicited.

Finally, if there are any formal matters remaining after this response, the Examiner is requested to telephone the undersigned to attend to these matters.

If there are any additional fees associated with filing of this Amendment, please charge the same to our Deposit Account No. 19-3935.

Respectfully submitted,

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